

type of a prior genus must be eliminated) and *atomaria*, a new name for *lactea*, Müll. Section *b* contained the *Helix sulcata* of Müller, a form which Swainson, in 1840, made the type of his group *Plicadomus*. These eliminations leave *H. lactea* the valid nucleus of Schumacher's group. . . . Beck's use of *Otala* has no bearing upon the case, as he included none of Schumacher's species in his group."

Against this von Möllendorff quotes from Herrmannsen and Beck, as he had not seen Schumacher's work; and after further remarks concludes to use the name *Marmorana*, Hartmann, for the group, placing "*Otala*, Pilsbry," as a synonym thereto.

This conclusion cannot, however, be maintained, since *Marmorana* was based upon the species *serpentina*, which belongs *not to the group under discussion*, but to *Iberus*. Hartmann's sole reference to *Marmorana* is the passage (*apropos* of a certain malformation) which reads: "Herr Graf Porro hielt sie für sehr merkwürdig und sandte mir mehrere solche von unserer *Euparyphia*, auch von *Marmorana serpentina*; wirklich ist die Ursache dieser abnormen Fortsetzung schwierig zu ermitteln," &c. Thus was *Marmorana* established. And von Möllendorff gravely concludes: "Danach würde *Marmorana* auf die Formenkreise von *vermiculata* und *lactea* zu beschränken sein"!

XLIV.—Some Questions of Myriopod Nomenclature.

By R. I. POCKOCK.

1. Leach's Species of the Genus *Geophilus*.

THE genus *Geophilus*, Leach, originally contained the following species:—*carpophagus*, *subterraneus*, *acuminatus*, *longicornis* (Tr. Linn. Soc. xi. pp. 384–386, 1819). One of these must be the type of the genus. *Longicornis* was taken out by Newport (Proc. Zool. Soc. 1842, p. 180) as the type of *Necrophlæophagus*. In 1845 (Tr. Linn. Soc. xix. p. 429 &c.) Newport substituted *Arthronomalus* for *Necrophlæophagus*, and added the following species:—*punctiventris*, *carpophagus*, *similis* (= *carpophagus*), *Hopei*, *flavus*, and *opinatus*. Since Newport expressly states that he changed *Necrophlæophagus* for *Arthronomalus*, the two must be regarded as synonymous in the strictest possible sense of the term—that is to say, as having the same type species. It is superfluous, therefore, to pursue further the fate of the remaining species included under *Arthronomalus* with a view to ascertaining if one of

them can stand as its type. It may be added, however, that *carpophagus* was eliminated by Meinert in 1869 (Nat. Tidskr. iv. p. 97) under the name *sodalis* as a *Scnipæus*, of which it may be regarded as the type if *Scnipæus* is ever restored to use. Thus two of the species upon which *Geophilus* was primarily based are accounted for, and neither can be recognized as its type according to the "elimination" system. What, then, becomes of the generic name? Since neither of the two just mentioned is available, it must fall upon either *acuminatus* or *subterraneus*, and to them it was applied by Newport in his classical monograph (Tr. Linn. Soc. xix. pp. 434-438, 1845). But *acuminatus* was removed by C. Koch under the name *rosulans* as *Linotænia* (Syst. Myr. S. 188, 1847). Hence *subterraneus*, being the last species left in the genus *Geophilus*, comes out as its type; and since *subterraneus* is probably congeneric with *gracilis*, Meinert, the type of the genus *Stigmatogaster* of Latzel, *Stigmatogaster* becomes a synonym of *Geophilus*.

The four species, then, which originally constituted the genus *Geophilus* must now be associated with the following generic names, whether or not the names take the rank that was primarily assigned to them:—

Necrophlæophagus, Newport (= *Arthronomalus*, Newp.).

Type *longicornis*, Leach.

Scnipæus, Meinert.

Type *carpophagus*, Leach (= *sodalis*, Mein.).

Linotænia, Koch.

Type *acuminata*, Leach (= *rosulans*, Koch).

Geophilus, Leach (?= *Stigmatogaster*, Latz.).

Type *subterraneus*, Leach.

The adoption of the conclusions here stated involves two further changes in nomenclature, namely, the transference of the family name Geophilidæ to the group designated Himantariidæ by Cook, and the introduction of a new name for the group which currently passes as Geophilidæ. Necrophlæophagidæ obviously suggests itself for this purpose, in spite of its polysyllables and cacophony.

2. The Genera of *Blaniuloid* Diplopods.

In 1836 (Bull. Soc. Philom. p. 72) Gervais established the genus *Blaniulus* for the reception of the blind *Iulus guttulus* (Bosc), Fabricius, with which he rightly declared *Iulus*

pulchellus of Leach to be synonymous. *Guttulatus* therefore is the type of *Blaniulus*.

In 1851 a second genus, namely *Nopoiulus*, was introduced by Menge (Neueste Schr. Ges. Danzig, iv. pt. 4, no. ii. p. 7) for a species named *punctulatus*, differing from the type of *Blaniulus* in possessing a row of seven eyes on each side of the head. *Punctulatus* therefore is the type of *Nopoiulus*. This genus, however, dropped out of use as a synonym of *Blaniulus*, and was forgotten by the authors who have busied themselves with the Blaniuloid genera.

In 1898 Dr. Verhoeff found that *Blaniulus*, in the comprehensive sense recognized by Meinert, Latzel, and their successors, can be divided, mainly by the structure of its copulatory organs, into three genera, which are named *Typhloblaniulus*, for *guttulatus* and *troglobius*; *Trichoblaniulus*, for *hirsutus*; and *Blaniulus*, for *venustus*, *palmatum*, and *Phlepsii*. From the standpoint of nomenclature, however, this classification is open to obvious criticism. In the first place, since *guttulatus* is the type of *Blaniulus*, *Typhloblaniulus* must be a synonym of *Blaniulus*, and the latter cannot be assigned to the species typified by *venustus*. In the second place, since *venustus* is recognized as identical with *punctulatus* of Menge, the type of *Nopoiulus*, *Blaniulus* as restricted by Dr. Verhoeff is nothing but *Nopoiulus* of Menge (see Archiv f. Naturgesch. 1898, p. 172).

A fourth genus was introduced by Silvestri (Bull. Soc. Ent. Ital. xxix. p. 24, 1897), namely, *Proteroiulus*, for *Blaniulus fuscus*, Stein.

Hence the genera of this group will stand as follows:—

Blaniulus, Gervais (= *Typhloblaniulus*, Verh.).

Type *guttulatus*, Bosc.

Trichoblaniulus, Verhoeff.

Type *Blaniulus hirsutus*, Bröl.

Nopoiulus, Menge (= *Blaniulus*, Verh., nec Gervais).

Type *Iulus Kochii*, Gervais (= *pulchellus*, Koch nec Leach, *punctulatus*, Menge, and *venustus*, Meinert)*.

Proteroiulus, Silvestri.

Type *Blaniulus fuscus*, Stein.

* Latzel's reasons for calling this species *venustus* are not clear, since both *Kochii* and *punctulatus* are older names and antedate it in the list of synonyms given in that author's classical work.